



TEST REPORT

Applicant: PITE TECH. INC.
Address of Applicant: 4/F, Bldg A, Chiwan Industrial Park, Shaodi Rd., Chiwan,
Shekou Area, Shenzhen, China

Equipment Under Test (EUT)

Product Name: LOAD BANK
Model No.: PITE 3932T, PITE 398X(X=0-9)

Applicable standards: EN 61326-1:2013
EN 61000-3-2:2014
EN 61000-3-3:2013

Date of sample receipt: April 12, 2018
Date of Test: April 12, 2018 To May 29, 2018
Date of report issued: May 29, 2018
Test Result : PASS *

* In the configuration tested, the EUT complied with the standards specified above.

The CE mark as shown below can be used, under the responsibility of the manufacturer, after completion of an EU Declaration of Conformity and compliance with all relevant EU Directives.

Authorized Signature

Kevin Wang
Laboratory Manager





2 Version

<i>Version No.</i>	<i>Date</i>	<i>Description</i>
00	May 29, 2018	Original

Prepared By: Gary Wang
Project Engineer

Date:



Reviewed By: Kevin Wang
Reviewer

Date:

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4 Test Summary

Test Item	Test Requirement	Test Method	Class / Severity	Result
Radiated Emission	EN 61326-1	EN 55011	Class A	Pass
Conducted Emission	EN 61326-1	EN 55011	Class A	Pass
Harmonic Current Emission	EN 61000-3-2	EN 61000-3-2	Class A	Pass
Voltage Fluctuations and Flicker	EN 61000-3-3	EN 61000-3-3	Clause 5	Pass
Electrostatic discharge	EN 61326-1	EN 61000-4-2	Contact ± 4 kV Air ± 8 kV	Pass
Radiated Immunity (80MHz-2.7GHz)	EN 61326-1	EN 61000-4-3	3V/m, 1V/m 80%, 1kHz, AM	Pass
Electrical fast transients	EN 61326-1	EN 61000-4-4	± 2.0 kV for AC port;	Pass
Surges	EN 61326-1	EN 61000-4-5	1kV Line to Line 2kV Line to Ground	Pass
Conducted Immunity	EN 61326-1	EN 61000-4-6	10V/m, 80%, 1kHz Amp. Mod. 3V/m, 80%, 1kHz Amp. Mod. 1V/m, 80%, 1kHz Amp. Mod.	Pass
Voltage dips and interruptions	EN 61326-1	EN 61000-4-11	0 % UT for 1per 40 % UT for 10per 70 % UT for 25per 0 % UT for 250per UT is Supply Voltage	Pass

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5 General Information

5.1 Client Information

Applicant:	PITE TECH. INC.
Address of Applicant:	4/F, Bldg A, Chiwan Industrial Park, Shaodi Rd., Chiwan, Shekou Area, Shenzhen, China
Manufacturer:	PITE TECH. INC.
Address of Manufacturer:	4/F, Bldg A, Chiwan Industrial Park, Shaodi Rd., Chiwan, Shekou Area, Shenzhen, China

5.2 General Description of EUT

Product Name:	LOAD BANK
Model No.:	PITE 3932T, PITE 398X(X=0-9) Remark: All models are identical in the same PCB layout, interior structure and electrical circuits. The only differences are the model name and appearance color for commercial purpose.
Test Model No.:	PITE 3932T
Power Supply:	Input: AC 220-240V, 50Hz

5.3 Test mode

On mode: Keep the EUT in the operation status
--

5.4 Description of Support Units

None.

5.5 Deviation from Standards

None.

5.6 Abnormalities from Standard Conditions

None.

5.7 Monitoring of EUT for All Immunity Test

Visual:	Monitor the EUT operating status.
Audio:	N/A



6 Test Instruments List

Radiated Emission:						
Item	Test Equipment	Manufacturer	Model No.	Inventory No.	Cal.Date (mm-dd-yy)	Cal.Due date (mm-dd-yy)
1	3m Semi- Anechoic Chamber	ZhongYu Electron	9.0(L)*6.0(W)* 6.0(H)	GTS250	Jul. 3 2015	Jul. 2 2020
2	Control Room	ZhongYu Electron	6.2(L)*2.5(W)* 2.4(H)	GTS251	N/A	N/A
3	ESU EMI Test Receiver	R&S	ESU26	GTS203	Jun. 29 2017	Jun. 28 2018
4	BiConiLog Antenna	SCHWARZBECK	VULB9163	GTS214	Jun. 29 2017	Jun. 28 2018
5	Double-ridged horn antenna	SCHWARZBECK	9120D	GTS208	Jun. 29 2017	Jun. 28 2018
6	RF Amplifier	HP	8347A	GTS204	Jun. 29 2017	Jun. 28 2018
7	Broadband Preamplifier	SCHWARZBECK	BBV9718	GTS535	Jun. 29 2017	Jun. 28 2018
8	EMI Test Software	AUDIX	E3	N/A	N/A	N/A
9	Coaxial cable	GTS	N/A	GTS210	N/A	N/A
10	Coaxial Cable	GTS	N/A	GTS211	N/A	N/A
11	Thermo meter	KTJ	TA328	GTS256	Jun. 29 2017	Jun. 28 2018

Conducted Emission						
Item	Test Equipment	Manufacturer	Model No.	Inventory No.	Cal.Date (mm-dd-yy)	Cal.Due date (mm-dd-yy)
1	Shielding Room	ZhongYu Electron	7.3(L)x3.1(W)x2.9(H)	GTS252	May.16 2014	May.15 2019
2	EMI Test Receiver	R&S	ESCI 7	GTS552	Jun. 29 2017	Jun. 28 2018
3	Pulse Limiter	R&S	ESH3-Z2	GTS224	Jun. 29 2017	Jun. 28 2018
4	Coaxial Switch	ANRITSU CORP	MP59B	GTS225	Jun. 29 2017	Jun. 28 2018
5	Artificial Mains Network	SCHWARZBECK MESS	NSLK8127	GTS226	Jun. 29 2017	Jun. 28 2018
6	Coaxial Cable	GTS	N/A	GTS227	N/A	N/A
7	EMI Test Software	AUDIX	E3	N/A	N/A	N/A
8	Thermo meter	KTJ	TA328	GTS233	Jun. 29 2017	Jun. 28 2018
9	ISN	EMTEST	FCC-TLISN-T8-02	GTS563	Jun. 29 2017	Jun. 28 2018

EFT, Surge, Voltage dips and Interruption:						
Item	Test Equipment	Manufacturer	Model No.	Inventory No.	Cal.Date (mm-dd-yy)	Cal.Due date (mm-dd-yy)
1	EMTEST system	EMTEST	UCS500N	GTS239	Jun. 29 2017	Jun. 28 2018
2	Thermo meter	KTJ	TA328	GTS233	Jun. 29 2017	Jun. 28 2018
3	capacitive Clamp	EMTEST	HFK	GTS557	Jun. 29 2017	Jun. 28 2018

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ESD:						
Item	Test Equipment	Manufacturer	Model No.	Inventory No.	Cal.Date (mm-dd-yy)	Cal.Due date (mm-dd-yy)
1	ESD Simulator	KIKUSUI	KES4021A	GTS242	Jun. 29 2017	Jun. 28 2018
2	Thermo meter	KTJ	TA328	GTS243	Jun. 29 2017	Jun. 28 2018

Harmonic/ Flicker:						
Item	Test Equipment	Manufacturer	Model No.	Inventory No.	Cal.Date (mm-dd-yy)	Cal.Due date (mm-dd-yy)
1	HARMONIC/FLICKER ANALYZER	KIKUSUI	KHA1000	GTS235	Jun. 29 2017	Jun. 28 2018
2	AC POWER SUPPLY	KIKUSUI	PCR4000LE	GTS236	Jun. 29 2017	Jun. 28 2018
3	LINE IMPEDANCE NETWORK	KIKUSUI	LIN1020JF	GTS237	Jun. 29 2017	Jun. 28 2018
4	Thermo meter	KTJ	TA328	GTS256	Jun. 29 2017	Jun. 28 2018

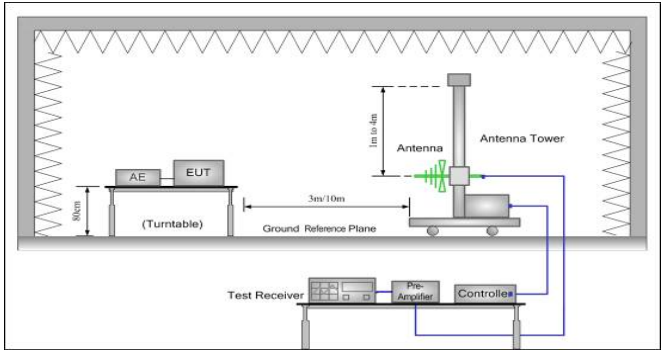
Conducted Immunity:						
Item	Test Equipment	Manufacturer	Model No.	Inventory No.	Cal.Date (mm-dd-yy)	Cal.Due date (mm-dd-yy)
1	Signal Generator	SCHLODER	CDG-6000-25	GTS553	Jun. 29 2017	Jun. 28 2018
2	CDN	SCHLODER	CDN-M2+3	GTS554	Jun. 29 2017	Jun. 28 2018
3	EM-Clapm	SCHLODER	EMCL-20	GTS555	Jun. 29 2017	Jun. 28 2018
4	ATT	SCHLODER	ATT-6DB-100	GTS556	Jun. 29 2017	Jun. 28 2018

Radiated Immunity:						
Item	Test Equipment	Manufacturer	Model No.	Serial No.	Cal.Date (mm-dd-yy)	Cal.Due Date (mm-dd-yy)
1	Signal Generator	Rohde & Schwarz	SMT03	100059	Jan. 16 2018	Jan. 15 2019
2	Power Amplifier	AR	150W1000	300999	Jan. 16 2018	Jan. 15 2019
3	Power Amplifier	AR	25S1G4AM1	305993	Jan. 16 2018	Jan. 15 2019
4	Power Amplifier	AR	150A220M6	305965	Jan. 16 2018	Jan. 15 2019
5	Broadband antenna	CHASE	CBL6111C	2576	Jan. 16 2018	Jan. 15 2019
6	Horn Antenna	AR	AT4002A	2783	Jan. 16 2018	Jan. 15 2019

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7 Emission Test Results

7.1 Radiated Emission

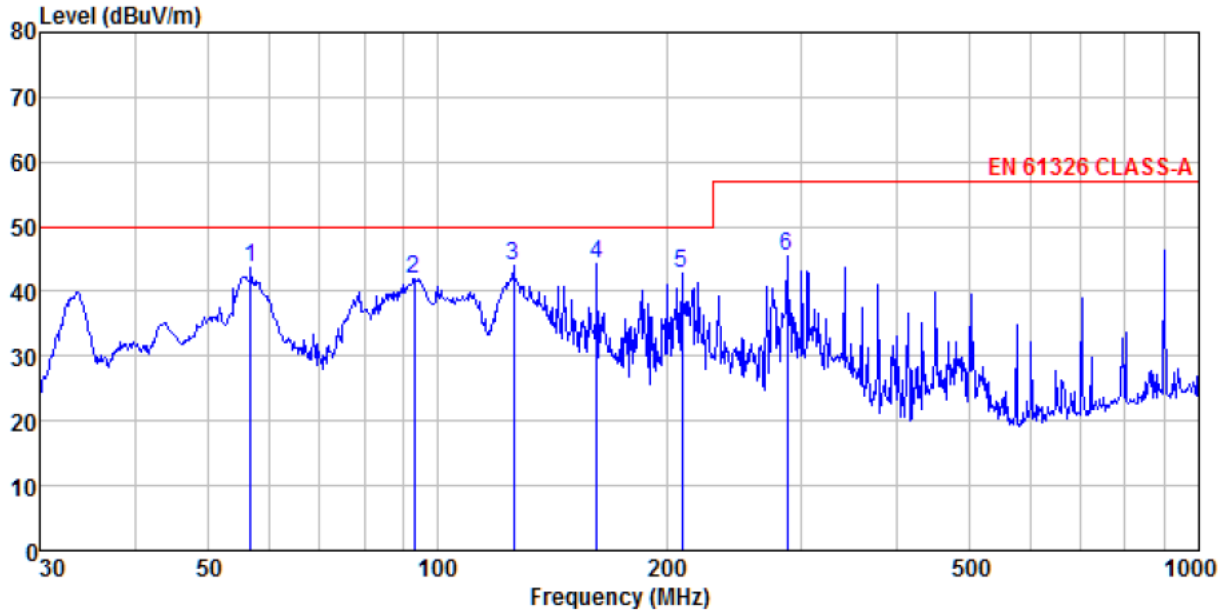
Test Requirement:	EN 61326-1		
Test Method:	EN 55011		
Test Frequency Range:	30MHz to 1GHz		
Class / Severity:	A		
Measurement Distance:	3m		
Limit:	Frequency	Limit (dB μ V/m)	Value
	30MHz-230MHz	50.00	Quasi-peak
	230MHz-1GHz	57.00	Quasi-peak
Test setup:			
Test Procedure:	<ol style="list-style-type: none"> 1. The radiated emissions test was conducted in a semi-anechoic chamber. 2. The tabletop EUT was placed upon a non-metallic table 0.8m above the ground reference plane. And for floor-standing arrangement, the EUT was placed on the horizontal ground reference plane, but separated from metallic contact with the ground reference plane by 0.1m of insulation. 3. Before final measurements of radiated emissions, a pre-scan was performed in the spectrum mode with the peak detector to find out the maximum emissions spectrum plots of the EUT. 4. The frequencies of maximum emission were determined in the final radiated emissions measurement. At each frequency, the EUT was rotated 360°, and the antenna was raised and lowered from 1 to 4 meters in order to determine the maximum disturbance. Measurements were performed for both horizontal and vertical antenna polarization. 		
Test environment:	Temp.: 25 °C	Humid.: 52%	Press.: 1012mbar
Measurement Record:	Uncertainty: \pm 4.50dB		
Test Instruments:	Refer to section 6 for details		
Test mode:	Refer to section 5.3 for details		
Test results:	Pass		

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Measurement Data

Test mode:	On mode	Antenna Polarity:	Horizontal
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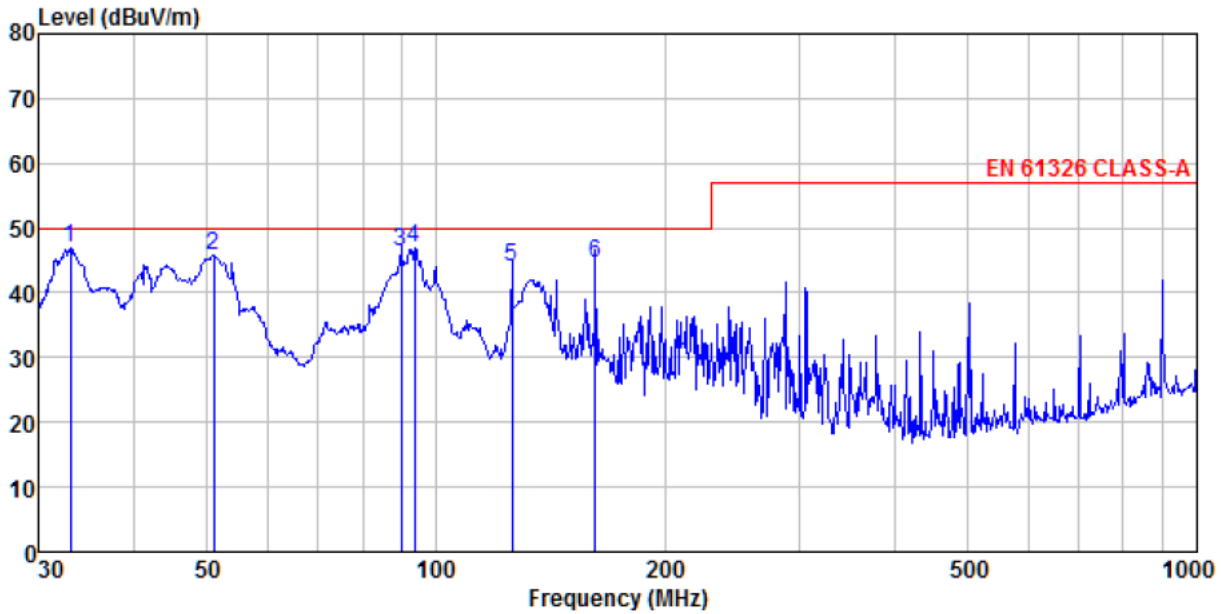


	Freq	Read Level	Antenna Factor	Preamp Factor	Cable Loss	Level	Limit Line	Over Limit	Remark
	MHz	dBuV	dB/m	dB	dB	dBuV/m	dBuV/m	dB	
1	56.792	67.52	11.60	36.28	0.83	43.67	50.00	-6.33	QP
2	93.113	66.32	11.18	36.66	1.14	41.98	50.00	-8.02	QP
3	125.886	70.86	8.74	36.92	1.41	44.09	50.00	-5.91	QP
4	162.041	71.46	8.34	37.14	1.64	44.30	50.00	-5.70	QP
5	209.313	67.52	10.76	37.34	1.89	42.83	50.00	-7.17	QP
6	287.990	67.31	13.27	37.41	2.31	45.48	57.00	-11.52	QP

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Test mode:	On mode	Antenna Polarity:	Vertical
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	Read Freq	Antenna Level	Preamp Factor	Cable Loss	Limit Level	Over Limit	Remark	
	MHz	dBuV	dB/m	dB	dBuV/m	dBuV/m	dB	
1	33.095	70.29	11.26	35.23	0.59	46.91	50.00	-3.09 QP
2	50.942	69.03	12.20	36.19	0.78	45.82	50.00	-4.18 QP
3	89.905	71.33	10.57	36.64	1.11	46.37	50.00	-3.63 QP
4	93.768	71.17	11.25	36.67	1.14	46.89	50.00	-3.11 QP
5	125.886	70.80	8.74	36.92	1.41	44.03	50.00	-5.97 QP
6	162.041	71.81	8.34	37.14	1.64	44.65	50.00	-5.35 QP

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7.2 Conducted Emission

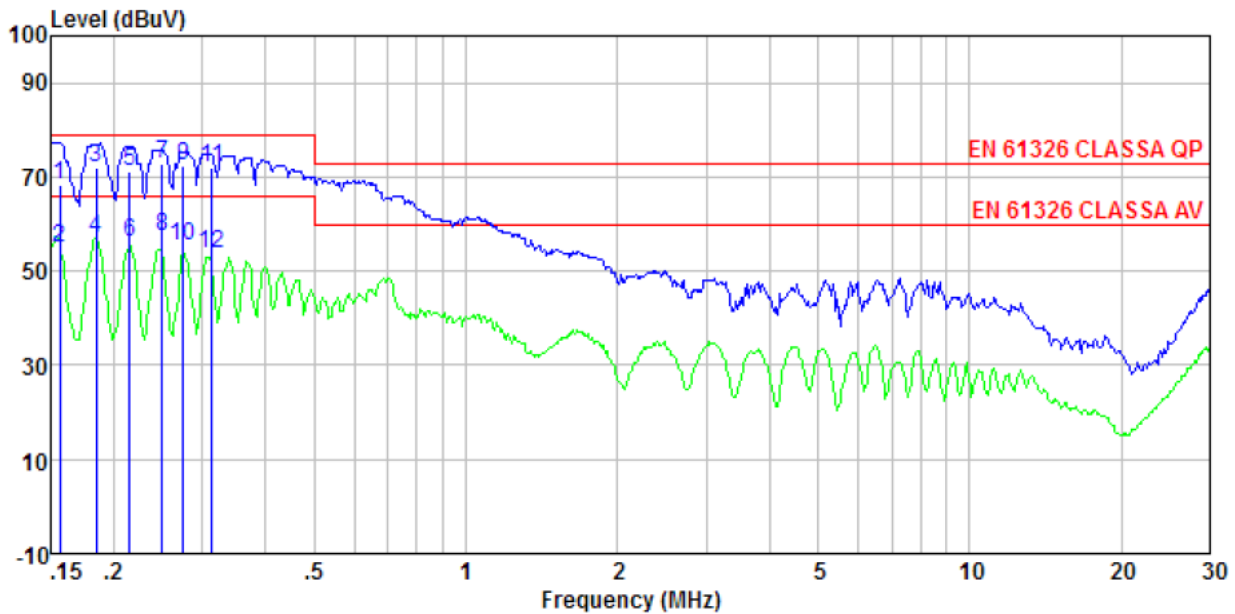
Test Requirement:	EN 61326-1		
Test Method:	EN 55011		
Test Frequency Range:	150kHz to 30MHz		
Class / Severity:	A		
Limit:	Frequency range (MHz)	Limit (dB μ V)	
		Quasi-peak	Average
	0.15-0.5	79	66
	0.5-30	73	60
Test setup:	<p><i>Remark:</i> EUT: Equipment Under Test LISN: Line Impedance Stabilization Network Test table height=0.8m</p>		
Test procedure:	<ol style="list-style-type: none"> 1. The EUT and simulators are connected to the main power through a line impedance stabilization network(LISN). The provide a 50ohm/50uH coupling impedance for the measuring equipment. 2. The peripheral devices are also connected to the main power through a LISN that provides a 50ohm/50uH coupling impedance with 50ohm termination. (Please refers to the block diagram of the test setup and photographs). 3. Both sides of A.C. line are checked for maximum conducted interference. In order to find the maximum emission, the relative positions of equipment and all of the interface cables must be changed according to EN55022 Class B on conducted measurement. 		
Test environment:	Temp.: 24 °C	Humid.: 51%	Press.: 1012mbar
Measurement Record:	Uncertainty: ± 3.45 dB		
Test Instruments:	Refer to section 6 for details		
Test mode:	Refer to section 5.3 for details		
Test results:	Pass		

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Measurement Data

Test mode:	On mode	Phase Polarity:	Line
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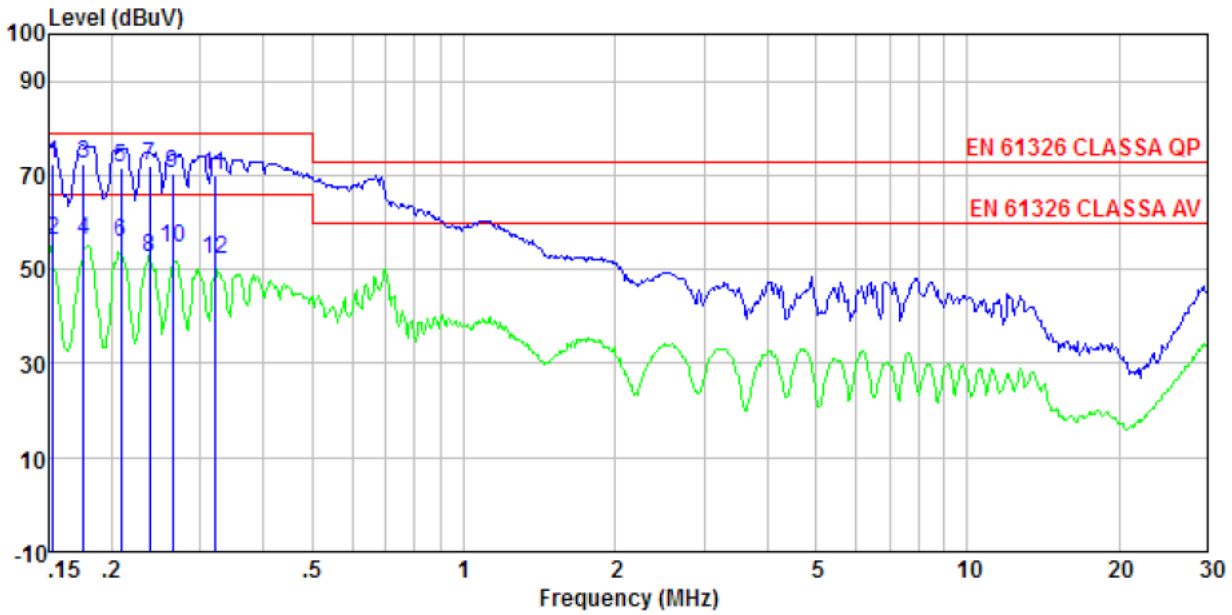
Freq MHz	Reading level dBuV	IISN/ISN factor dB	Cable loss dB	level dBuV	Limit level dBuV	Over limit dB	Remark
0.156	67.88	0.40	0.08	68.36	79.00	-10.64	QP
0.156	54.67	0.40	0.08	55.15	66.00	-10.85	Average
0.184	71.63	0.40	0.10	72.13	79.00	-6.87	QP
0.184	56.31	0.40	0.10	56.81	66.00	-9.19	Average
0.215	70.78	0.40	0.11	71.29	79.00	-7.71	QP
0.215	55.78	0.40	0.11	56.29	66.00	-9.71	Average
0.249	72.37	0.40	0.10	72.87	79.00	-6.13	QP
0.249	56.73	0.40	0.10	57.23	66.00	-8.77	Average
0.274	71.87	0.40	0.10	72.37	79.00	-6.63	QP
0.274	54.98	0.40	0.10	55.48	66.00	-10.52	Average
0.313	71.43	0.39	0.10	71.92	79.00	-7.08	QP
0.313	53.19	0.39	0.10	53.68	66.00	-12.32	Average

Remarks: level = Reading level + Antenna factor + Cable loss

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Test mode:	On mode	Phase Polarity:	Neutral
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Freq MHz	Reading level dBuV	IISN/ISN factor dB	Cable loss dB	level dBuV	Limit level dBuV	Over limit dB	Remark
0.153	71.81	0.40	0.07	72.28	79.00	-6.72	QP
0.153	55.82	0.40	0.07	56.29	66.00	-9.71	Average
0.176	71.77	0.40	0.09	72.26	79.00	-6.74	QP
0.176	55.60	0.40	0.09	56.09	66.00	-9.91	Average
0.208	71.06	0.40	0.11	71.57	79.00	-7.43	QP
0.208	55.28	0.40	0.11	55.79	66.00	-10.21	Average
0.238	71.66	0.40	0.11	72.17	79.00	-6.83	QP
0.238	51.82	0.40	0.11	52.33	66.00	-13.67	Average
0.264	69.99	0.40	0.10	70.49	79.00	-8.51	QP
0.264	54.18	0.40	0.10	54.68	66.00	-11.32	Average
0.320	69.50	0.39	0.10	69.99	79.00	-9.01	QP
0.320	51.80	0.39	0.10	52.29	66.00	-13.71	Average

Remarks: level = Reading level + Antenna factor + Cable loss

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7.3 Harmonic Current Emission

Test Requirement:	EN 61326-1		
Test Method:	EN 61000-3-2		
Frequency range:	100Hz to 2kHz		
Measurement Time:	2.5 min		
Class/Severity:	Class A		
Detector:	As per EN 61000-3-2		
Test environment:	Temp.: 24°C	Humid.: 51%	Press.: 1010bar
Test Instruments:	Refer to section 5 for details		
Test mode:	Refer to section 4.3 for details		
Test results:	Passed		

7.4 Flicker Emission

Test Requirement:	EN 61326-1		
Test Method:	EN 61000-3-3		
Class/Severity:	Clause 5 of EN 61000-3-3		
Measurement Time:	10 min		
Detector:	As per EN 61000-3-3		
Test environment:	Temp.: 24 °C	Humid.: 51%	Press.: 1012mbar
Test Instruments:	Refer to section 6 for details		
Test mode:	Refer to section 5.3 for details		
Test results:	Pass		

Measurement Data

Test Item	EUT values	Limit	Result
Pst	0.043	1.00	PASS
Plt	0.093	0.65	PASS
dc [%]	0.000	3.30	PASS
dmax [%]	0.174	4.00	PASS
dt [s]	0.000	0.50	PASS

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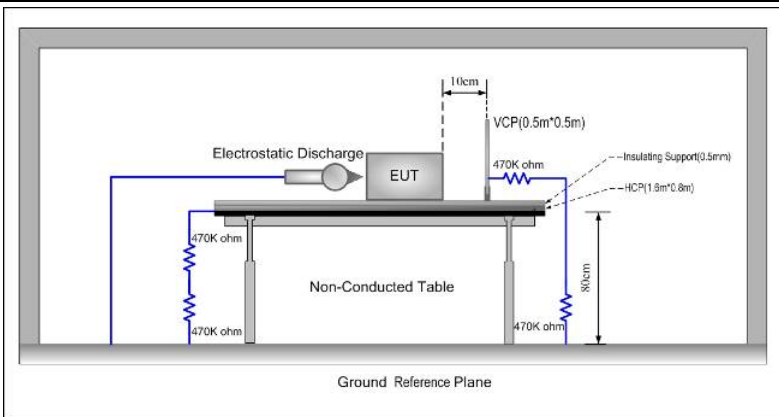


8 Immunity Test Results

8.1 Performance Criteria Description in Clause 6.4 of EN 61326-1

Criterion A:	The equipment shall continue to operate as intended during and after the test. No degradation of performance or loss of function is allowed below a performance level specified by the manufacturer, when the equipment is used as intended. The performance level may be replaced by a permissible loss of performance. If the minimum performance level or the permissible performance loss is not specified by the manufacturer, either of these may be derived from the product description and documentation and what the user may reasonably expect from the equipment if used as intended.
Criterion B:	The equipment shall continue to operate as intended during and after the test. No degradation of performance or loss of function is allowed below a performance level specified by the manufacturer, when the equipment is used as intended. The performance level may be replaced by a permissible loss of performance. If the minimum performance level or the permissible performance loss is not specified by the manufacturer, either of these may be derived from the product description and documentation and what the user may reasonably expect from the equipment if used as intended.
Criterion C:	Temporary loss of function is allowed, provided the function is self-recoverable or can be restored by the operation of the controls.

8.2 Electrostatic discharge

Test Requirement:	EN 61326-1
Test Method:	EN 61000-4-2
Discharge Voltage:	Contact Discharge: $\pm 2\text{kV}$, $\pm 4\text{kV}$ Air Discharge: $\pm 2\text{kV}$, $\pm 4\text{kV}$, $\pm 8\text{kV}$ HCP/VCP: $\pm 2\text{kV}$, $\pm 4\text{kV}$
Polarity:	Positive & Negative
Number of Discharge:	Contact Discharge: Minimum 25 times at each test point, Air Discharge: Minimum 10 times at each test point.
Discharge Mode:	Single Discharge
Discharge Period:	1 second minimum
Performance Criterion:	B
Test setup:	
Test Procedure:	<p>1. Air discharge: The test was applied on non-conductive surfaces of EUT. The round discharge tip of the discharge electrode was approached as fast as possible to touch the EUT. After each discharge, the discharge electrode was removed from the EUT. The generator was re-triggered for a new single discharge and repeated 10 times for each pre-selected test point. This procedure was repeated until all the air discharge completed</p> <p>2. Contact Discharge: The test was applied on conductive surfaces of EUT. the generator was re-triggered for a new single discharge and repeated 25 times for each pre-selected test point. the tip of the discharge electrode was touch the EUT before the discharge switch was operated.</p> <p>3. Indirect discharge for horizontal coupling plane At least 10 single discharges shall be applied at the front edge of each HCP opposite the centre point of each unit of the EUT and 0.1m from the front of the EUT. The long axis of the discharge electrode shall be in the plane of the HCP and perpendicular to its front edge during the discharge. Consideration should be given to exposing all sides of the EUT.</p>

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	4. Indirect discharge for vertical coupling plane		
	At least 10 single discharges were applied to the center of one vertical edge of the coupling plane. The coupling plane, of dimensions 0.5m X 0.5m, was placed parallel to, and positioned at a distance of 0.1m from the EUT. Discharges were applied to the coupling plane, with this plane in sufficient different positions that the four faces of the EUT are completely illuminated.		
Test environment:	Temp.: 24 °C	Humid.: 51%	Press.: 1012mbar
Test mode:	Refer to section 6 for details		
Test Instruments:	Refer to section 5.3 for details		
Test results:	Pass		

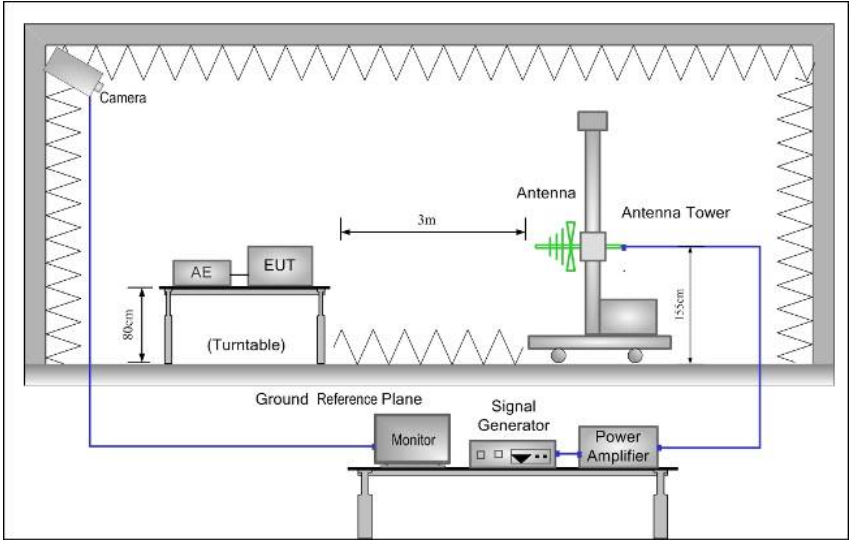
Measurement Record:

Test points:	I: Metal shell, Screw			
	II: Screen, Crevice, Control key, Port			
Direct discharge				
Discharge Voltage (KV)	Type of discharge	Test points	Observations (Performance Criterion)	Result
± 4	Contact	I	A	Pass
± 8	Air	II	A	Pass
Indirect discharge				
Discharge Voltage (KV)	Type of discharge	Test points	Observation Performance	Result
± 4	HCP-Bottom/Top/ Front/Back/Left/Right	Edge of the HCP	A	Pass
± 4	VCP-Front/Back /Left/Right	Center of the VCP	A	Pass

Remark:

A: No degradation in performance of the EUT was observed.

8.3 Radiated Immunity(80MHz-2.7GHz)

Test Requirement:	EN 61326-1
Test Method:	EN 61000-4-3
Frequency range:	80MHz to 1GHz, 1.4GHz to 2GHz, 2GHz to 2.7GHz
Modulation:	80%, 1kHz Amplitude Modulation
Performance Criterion:	A
Test setup:	
Test Procedure:	<ol style="list-style-type: none"> 1. For table-top equipment, the EUT was placed in the chamber on a non-conductive table 0.8m high. For arrangement of floor-standing equipment, the EUT was mounted on a non-conductive support 0.1m above the supporting plane. For human body-mounted equipment, the EUT may be tested in the same manner as table top items. 2. If possible, a minimum of 1 m of cable is exposed to the electromagnetic field. Excess length of cables interconnecting units of the EUT shall be bundled low-inductively in the approximate center of the cable to form a bundle 30 cm to 40 cm in length. 3. The EUT was initially placed with one face coincident with the calibration plane. The EUT face being illuminated was contained within the UFA (Uniform Field Area). 4. The frequency ranges to be considered were swept with the signal modulated and pausing to adjust the RF signal level or to switch oscillators and antennas as necessary. Where the frequency range was swept incrementally, the step size was not exceed 1 % of the preceding frequency value. 5. The dwell time of the amplitude modulated carrier at each frequency was not be less than the time necessary for the EUT to be exercised and to respond, and was not less than 0,5 s. 6. The test normally was performed with the generating antenna facing each side of the EUT.

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	7. The polarization of the field generated by each antenna necessitates testing each selected side twice, once with the antenna positioned vertically and again with the antenna positioned horizontally. 8. The EUT was performed in a configuration to actual installation conditions, a video camera and/or a audio monitor were used to monitor the performance of the EUT.		
Test environment:	Temp.: 25 °C	Humid.: 52%	Press.: 1012mbar
Test Instruments:	Refer to section 6 for details		
Test mode:	Refer to section 5.3 for details		
Test results:	Pass		

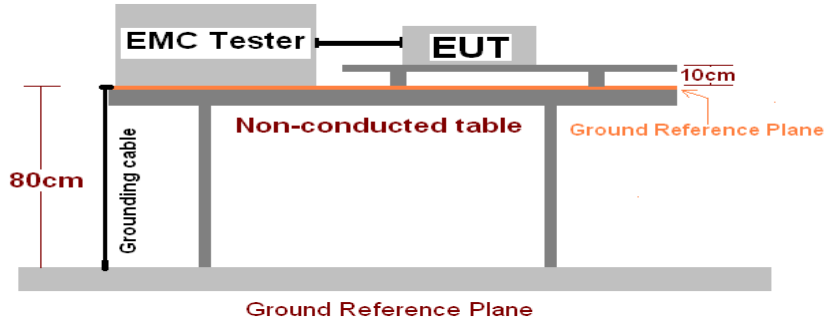
Measurement Record:

Frequency	Level (V/m)	EUT Face	Dwell time	Observations	Result
80MHz-1GHz	10	Front	2s	A	Pass
		Back		A	Pass
		Left		A	Pass
		Right		A	Pass
		Top		A	Pass
		Underside		A	Pass
1.4GHz-2GHz	3	Front	2s	A	Pass
		Back		A	Pass
		Left		A	Pass
		Right		A	Pass
		Top		A	Pass
		Underside		A	Pass
2GHz-2.7GHz	1	Front	2s	A	Pass
		Back		A	Pass
		Left		A	Pass
		Right		A	Pass
		Top		A	Pass
		Underside		A	Pass

Remark:

A: No degradation in performance of the EUT was observed.

8.4 Electrical fast transients

Test Requirement:	EN 61326-1
Test Method:	EN 61000-4-4
Test Level:	a.c. power port – 2 kV
Polarity:	Positive & Negative
Burst Period:	300ms
Test Duration:	2 minute per level & polarity
Performance Criterion:	B
Test setup:	
Test Procedure:	<ol style="list-style-type: none"> 1. The EUT and its simulators were placed on the ground reference plane and were insulated from it by a wood support 0.1m + 0.01m thick. The ground reference plane was 1m*1m metallic sheet with 0.65mm minimum thickness. 2. This reference ground plane was project beyond the EUT by at least 0.1m on all sides and the minimum distance between EUT and all other conductive structure, except the ground plane was more than 0.5m. 3. All cables to the EUT was placed on the wood support, cables not subject to EFT/B was routed as far as possible from the cable under test to minimize the coupling between the cables. 4. The length of power lines between the coupling device and the EUT is 0.5m 5. The EUT is connected to the power mains through a coupling device that directly couples the EFT/B interference signal. 6. Each of the Line and Neutral conductors is impressed with burst noise for 2 minutes.
Test environment:	Temp.: 26 °C Humid.: 54% Press.: 1012mbar
Test Instruments:	Refer to section 6 for details
Test mode:	Refer to section 5.3 for details
Test results:	Pass

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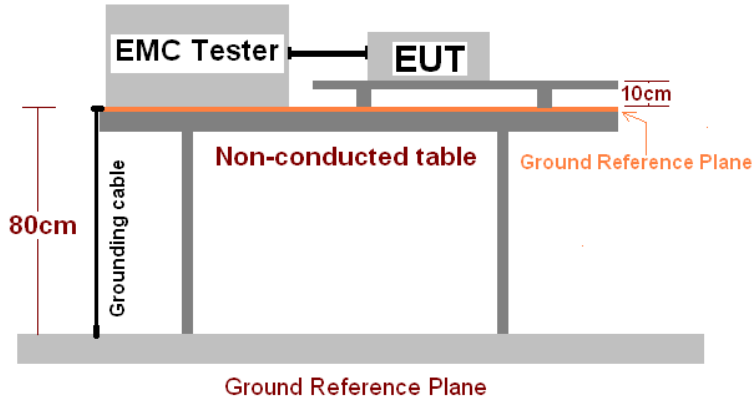
Measurement Record:

Lead under Test	Level (\pm kV)	Coupling Direct/Clamp	Observations (Performance Criterion)	Result
L	± 2.0	Direct	A	Pass
N	± 2.0	Direct	A	Pass
L-N	± 2.0	Direct	A	Pass
PE	± 2.0	Direct	A	Pass
L-PE	± 2.0	Direct	A	Pass
N-PE	± 2.0	Direct	A	Pass
L-N-PE	± 2.0	Direct	A	Pass

Remark:

A: No degradation in performance of the EUT was observed.

8.5 Surges

Test Requirement:	EN 61326-1
Test Method:	EN 61000-4-5
Test Level:	1kV line to line 2kV Live to Earth
Polarity:	Positive & Negative
Generator source impedance:	2Ω (line-line coupling) 12Ω (line-earth coupling)
Interval:	60s between each surge
No. of surges:	5 positive, 5 negative at 0°, 90°, 180°, 270°.
Performance Criterion:	B
Test setup:	 <p>The diagram illustrates the test setup. An EMC Tester and the Equipment Under Test (EUT) are positioned on a non-conducted table. The table is 80 cm high. A 10 cm gap exists between the top surface of the table and the ground reference plane. A grounding cable is connected to the table. The ground reference plane is also shown at the base of the setup.</p>
Test Procedure:	<ol style="list-style-type: none"> For line-to-line coupling mode, provide a 0.5kV 1.2/50us voltage surge (at open-circuit condition) and 8/20us current surge to EUT selected points, and for active line / neutral lines to ground are same except test level is 1kV. At least 5 positive and 5 negative (polarity) tests with a maximum 1/min repetition rate are applied during test. Different phase angles are done individually. Record the EUT operating situation during compliance test and decide the EUT immunity criterion for above each test.
Test environment:	Temp.: 26 °C Humid.: 53% Press.: 1012mbar
Test Instruments:	Refer to section 6 for details
Test mode:	Refer to section 5.3 for details
Test results:	Pass



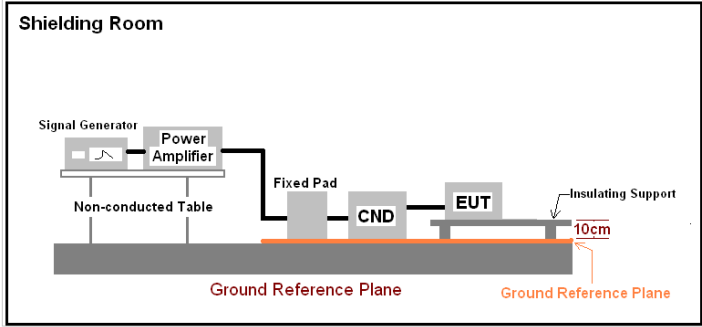
Measurement Record:

Location	Level(kV)	Polarity	Phase(deg)	Observations	Result
L-N	1.0	+,-	0°	A	Pass
			90°	A	Pass
			180°	A	Pass
			270°	A	Pass
L-PE	2.0	+,-	0°	A	Pass
			90°	A	Pass
			180°	A	Pass
			270°	A	Pass
N-PE	2.0	+,-	0°	A	Pass
			90°	A	Pass
			180°	A	Pass
			270°	A	Pass

Remark:

A: No degradation in performance of the EUT was observed.

8.6 Conducted Immunity

Test Requirement:	EN 61326-1
Test Method:	EN 61000-4-6
Frequency range:	0.15MHz to 80MHz
Test Level:	3V rms on AC Ports
Performance Criterion:	A
Test setup:	
Test Procedure:	<ol style="list-style-type: none"> The EUT are placed on an insulating support 0.1m high above a ground reference plane. CDN (coupling and decoupling device) is placed on the ground plane about 0.3m from EUT. Cables between CDN and EUT are as short as possible, and their height above the ground reference plane shall be between 30 and 50 mm (where possible). The disturbance signal described below is injected to EUT through CDN. The EUT operates within its operational mode(s) under intended climatic conditions after power on. Recording the EUT operating situation during compliance testing and decide the EUT immunity criterion.
Test environment:	Temp.: 24 °C Humid.: 51% Press.: 1012mbar
Test Instruments:	Refer to section 6 for details
Test mode:	Refer to section 5.3 for details
Test results:	Pass

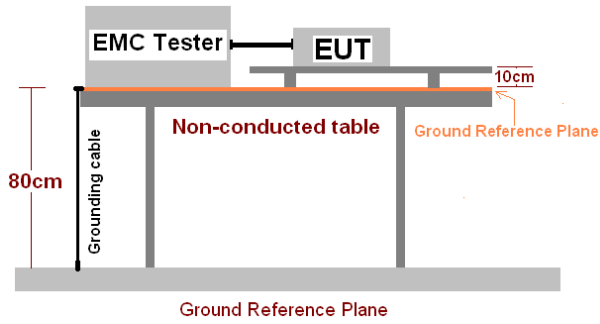
Measurement Record:

Frequency	Injected Position	Level	Modulation	Observations (Performance Criterion)	Result
150kHz to 80MHz	AC Mains	3Vrms	1 kHz, 80 % Amp. Mod, 1 % increment, dwell time=2seconds	A	Pass

Remark:

A: No degradation in performance of the EUT was observed.

8.7 Voltage dips and interruptions

Test Requirement:	EN 61326-1
Test Method:	EN 61000-4-11
Number of Dips / Interruptions:	3 per Level
Performance Criterion:	0% of UT (Supply Voltage) for 1 Periods: B; 40% of UT for 10 Periods: C; 70% of UT for 25 Periods: C; 0% of UT for 250 Periods: C;
Test setup:	
Test Procedure:	<ol style="list-style-type: none"> The EUT and test generator were setup as shown on above setup photo. The interruptions are introduced at selected phase angles with specified duration. Record any degradation of performance.
Test environment:	Temp.: 26 °C Humid.: 53% Press.: 1012mbar
Test Instruments:	Refer to section 6 for details
Test mode:	Refer to section 5.3 for details
Test results:	Pass

Measurement Record:

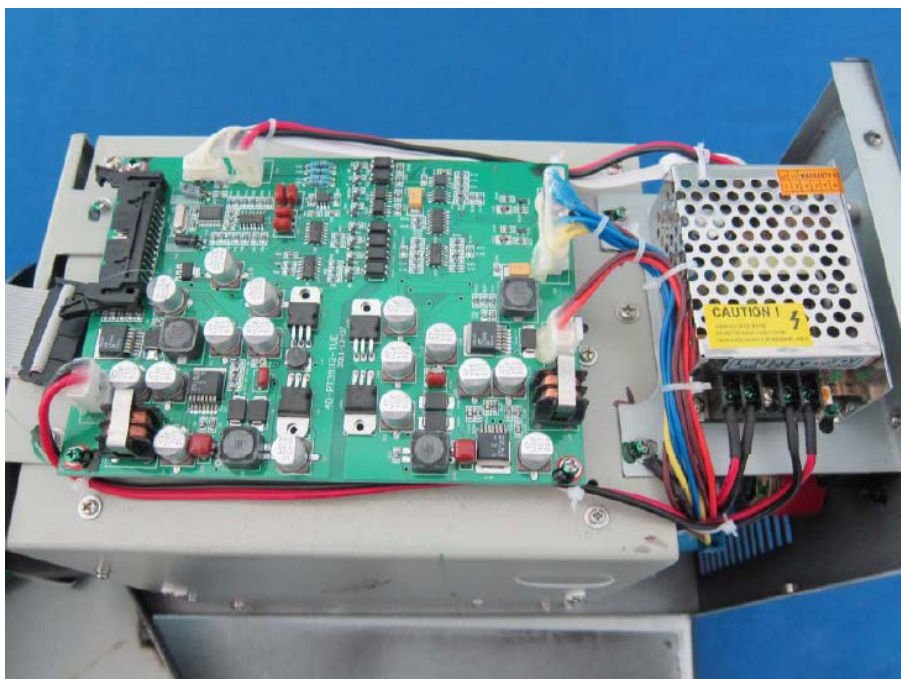
Test Level % U_T	Duration (Periods)	Phase angle	No. of drop out	Observations (Performance Criterion)	Result
0	1	0°, 90°, 180°, 270°	3	A	Pass
40	10	0°, 90°, 180°, 270°	3	A	Pass
70	25	0°, 90°, 180°, 270°	3	B	Pass
0	250	0°, 90°, 180°, 270°	3	C	Pass

Remark:

B: No degradation in performance of the EUT was observed.

C: Dips to 0%, Duration 250P, EUT stopped operation, After the test to restore

9 EUT Constructional Details



-----End-----

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